



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/692,196	10/23/2003	Greg R. Black	CS23157RA	8429
20280	7590	10/17/2005		
MOTOROLA INC 600 NORTH US HIGHWAY 45 ROOM AS437 LIBERTYVILLE, IL 60048-5343			EXAMINER DESIR, PIERRE LOUIS	
			ART UNIT 2681	PAPER NUMBER

DATE MAILED: 10/17/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/692,196	BLACK, GREG R.	
	Examiner	Art Unit	
	Pierre-Louis Desir	2681	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 September 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-39 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-39 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 23 October 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Arguments

1. Applicant's arguments with respect to claims 1, 20, 26, and 30 have been considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 4, 8, 28-29, 32, and 34 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Regarding claims 4, 8, 28-29, 32, and 34, the phrase "channel type" renders the claim indefinite because it is unclear whether the limitation(s) following the phrase are part of the claimed invention.

Note: for the process of examination, the phrase "channel type" would be interpreted as "channel."

Claim Rejections - 35 USC § 102

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

5. Claims 1-8, 11-18, 20-39 are rejected under 35 U.S.C. 102(e) as being anticipated by Crockett et al. (Crockett), U.S. Patent No. 6781963.

Regarding claim 1, Crockett discloses a method of push-to-talk operation, comprising: monitoring push-to-talk usage of a mobile communication device, the usage being by a user of the mobile communication device (i.e., monitoring call activity) (see col. 8, lines 62-63, and col. 20, lines 33-35); determining a push-to-talk metric (i.e., PTT latency) (see col. 1, lines 44-48, and col. 21, line 43) based on the push to talk usage of the mobile communication device (i.e., as known in the art of wireless telecommunications, and as disclosed by Crockett, PTT latency is the time delay between when the user requests the floor and when he receives a positive or negative confirmation from the server that he has the floor and may begin speaking. Thus, PTT latency is based on the PTT usage of the mobile communication device) (see col. 1, lines 44-48); and selecting a push-to-talk session unavailability mitigation based on the push-to-talk metric (i.e., reducing PTT latency) (see col. 23, lines 26-30).

Regarding claim 2, Crockett discloses a method (see claim 1 rejection) wherein the session unavailability comprises a delay of an activation of a push-to-talk session (see col. 23, lines 7-11, and lines 17-24).

Regarding claim 3, Crockett discloses a method (see claim 1 rejection) wherein the session unavailability mitigation comprises a mitigation of delay of an activation of a push-to-talk session (see col. 23, lines 26-30).

Regarding claim 4, Crockett discloses a method (see claim 1 rejection) wherein the session unavailability mitigation further comprises selecting a packet switched channel (i.e., voice and/or data may be converted into data packets, which are suitable for a particular distributed network. Thus, when a user presses the PTT key, a request is generated. With the request, data is formatted for transmission over an appropriate channel, which may be a circuit switched or a packet switched) (see col. 19, line 64 through col. 20, lines 3, and col. 20, lines 19-30).

Regarding claim 5, Crockett discloses a method (see claim 1 rejection) wherein the session unavailability mitigation further comprises establishing a reverse link for a selected time period in anticipation that a reverse push-to-talk session is established (i.e., each wireless net member establishes a forward link and a reverse link. In addition, when a user presses the PTT key, a reverse link connection is inherently established for a predetermined time) (see col. 19, lines 63-66), and col. 23, lines 20-37).

Regarding claim 6, Crockett discloses a method (see claim 1 rejection) wherein the session unavailability mitigation comprises holding a push-to-talk button for a selected time period after release of a push-to-talk button in anticipation that a subsequent push-to-talk session is established (i.e., the PTT key is released so that a response message could be received within a predetermined time, which inherently indicate the holding of a push-to-talk connection for a selected time period) (see col. 1, lines 16-26, col. 19, lines 63-66, and col. 23, lines 20-37).

Regarding claim 7, Crockett discloses a method (see claim 1 rejection) wherein the session unavailability mitigation is a mitigation of interruption of a push-to-talk channel (group call signaling, such as the floor-control requests, floor-control responses, and dormancy wakeup messages, may be transmitted on some available common channels, without waiting for dedicated traffic channels to be re-established) (see col. 23, lines 26-30).

Regarding claim 8, Crockett discloses a method (see claim 1 rejection) wherein the session unavailability mitigation comprises selecting a circuit switched channel (i.e., voice and/or data may be converted into data packets, which are suitable for a particular distributed network. Thus, when a user presses the PTT key, a request is generated. With the request, data is formatted for transmission over an appropriate channel, which may be a circuit switched or a packet switched) (see col. 19, line 64 through col. 20, lines 3, and col. 20, lines 19-30).

Regarding claim 11, Crockett discloses a method (see claim 1 rejection) wherein the push-to-talk metric is based on a measurement of a length of a delay of push-to-talk channel activation (i.e., PTT latency) (see col. 1, lines 44-48, and col. 21, line 43).

Regarding claim 12, Crockett discloses a method (see claim 1 rejection) wherein the push-to-talk metric is based on a probability of an activation of a subsequent push-to-talk session (see col. 1, lines 16-24, and col. 23, lines 7-11, 17-24).

Regarding claim 13, Crockett discloses a method (see claim 1 rejection) wherein the push-to-talk metric is based on a time measurement of the length of time of a push-to-talk channel interruption (i.e., time delay between when the user requests the floor and when he receives a positive or negative confirmation from the server that he has the floor) (see col. 1, lines 44-48).

Regarding claim 14, Crockett discloses a method (see claim 1 rejection), wherein the push-to-talk metric is based on a probability of a push-to-talk channel interruption (to wake up a dormant data connection, the traffic channel must be reallocated, the resources must be reassigned, and the radio link protocol (RLP) layer must be reinitialized. The effect of this is that after a talk group has not talked for a while, when a user presses his PTT button to request the floor, the PTT latency for the first talk spurt is generally much longer than for subsequent talk spurts) (see col. 23, lines 17-24).

Regarding claim 15, Crockett discloses a method (see claim 1 rejection) wherein the push-to-talk metric is based on a time between subsequent push-to-talk sessions from the same mobile communication device (i.e., floor control requests where the user would send a message, and floor control response where the user would receive a message) (see col. 16, lines 41-54, and col. 23, lines 26-30).

Regarding claim 16, Crockett discloses a method (see claim 1 rejection) wherein the push-to-talk metric is based on a probability of subsequent push-to-talk sessions from the same mobile communication device (see claim 15 reasoning, and col. 16, lines 41-54, and col. 23, lines 26-30).

Regarding claim 17, Crockett discloses a method (see claim 1 rejection) wherein the push-to-talk metric is based on a probability of a push-to-talk session from one mobile communication device and a subsequent push-to-talk session from another mobile communication device on a reverse channel (floor control request and floor control response) (see col. 16, lines 41-54, and col. 23, lines 26-30).

Regarding claim 18, Crockett discloses a method (see claim 1 rejection) wherein the push-to-talk metric is based on a length of time of a push-to-talk session (i.e., time delay) (see col. 1, lines 44-48).

Regarding claim 20, Crockett discloses a method of push-to-talk operation for a mobile communication device, comprising: comparing at least one push-to-talk usage metric to a push-to-talk usage metric threshold, the push-to-talk usage metric being based on the usage of the mobile communication device by a user of the mobile communication device (i.e., PTT latency is the time delay between when the user requests the floor and when he receives a positive or negative confirmation from the server that he has the floor and may begin speaking. Knowing that the goal for responding to any PTT request is to consistently respond to the request in a predetermined time period, e.g., one second or less. Therefore, one skilled in the art would unhesitatingly conceptualize that the time delay between when a user requests the floor and receives a confirmation is inherently compared with the expected predetermined time period to determine the need to reduce PTT latency (see col. 1, lines 44-48, and col. 12, lines 54-57); selecting a session unavailability mitigation based on comparing the push-to-talk usage metric to the push-to-talk usage metric threshold (i.e., based on the inherent comparison, group signaling may be transmitted on some available common channels) (see col. 23, lines 26-30); establishing a push-to-talk session employing the session unavailability mitigation (see col. 23, lines 38-45); monitoring a parameter of operation of the push-to-talk session device (i.e., monitoring call activity) (see col. 8, lines 62-63, and col. 20, lines 33-35); and modifying the push-to-talk metric based on the parameter of operation of the push-to-talk session (for e.g., while monitoring the call activity, if the time delay exceeds the expected delay, PTT latency will be reduced by

transmitting group call signaling one some available common channel) (see col. 1, lines 44-48, and col. 12, lines 54-57, and col. 23, lines 26-30).

Regarding claim 21, Crockett discloses a method (see claim 20 rejection) wherein the session unavailability comprises a delay of an activation of a push-to-talk channel (see col. 23, lines 7-11, and lines 17-24).

Regarding claim 22, Crockett discloses a method (see claim 20 rejection) further comprising modifying a session unavailability mitigation parameter as a function of a push-to-talk usage metric (i.e., to reduce PTT latency, group call signaling may be transmitted over some common channels (session unavailability mitigation parameter); however, an inherent modification may be made wherein the user may be allowed to start talking after the user has requested floor control, by buffering the media before dedicated channels are re-established, which would reduce the user's apparent latency) (see col. 27, lines 29-36).

Regarding claim 23, Crockett discloses a method (see claim 22 rejection) wherein the session unavailability mitigation parameter comprises a time to delay the end of a push-to-talk session after a user releases a push-to-talk button (i.e., the system allows the talker to start talking before the listeners traffic channel have been fully re-established. Thus, when the user releases the end of this PTT session is inherently delayed until the listeners traffic channel is re-established) (see col. 27, lines 32-55).

Regarding claim 24, Crockett discloses a method (see claim 22 rejection) wherein the session unavailability mitigation parameter comprises a selection of a circuit switched push-to-talk session and a packet switched push-to-talk session channel (i.e., voice and/or data may be converted into data packets, which are suitable for a particular distributed network. Thus, when a

user presses the PTT key, a request is generated. With the request, data is formatted for transmission over an appropriate channel, which may be a circuit switched or a packet switched) (see col. 19, line 64 through col. 20, lines 3, and col. 20, lines 19-30).

Regarding claim 25, Crockett discloses a method (see claim 22 rejection) wherein the session unavailability mitigation parameter comprises duration of a reverse push-to-talk session from another mobile communication device (i.e., group signaling transmission) (see col. 23, lines 26-37).

Regarding claim 26, discloses a method of push-to-talk operation for a mobile communication device, comprising: loading at least one push-to-talk mitigation parameter (i.e., transmission of group call signaling over some available common channels) (see col. 23, lines 26-30); executing a push-to-talk algorithm to configure at least one push-to-talk session unavailability mitigation based on the push-to-talk mitigation parameter, the push-to-talk session unavailability mitigation controlling the operation of a push-to-talk function of the mobile communication device (i.e., with the transmission of the group signaling over the available common channels, the system inherently executes a PTT algorithm to reduce the PTT latency) (see col. 23, lines 26-20); establishing a push-to-talk session for the mobile communication device (see col. 23, lines 38-45); monitoring at least one metric of push-to-talk operation of the mobile communication device, the metric of push-to-talk operation being based on the usage of the communication device by a user of the mobile communication device (i.e., monitoring call activity by user) (see col. 8, lines 62-63, and col. 20, lines 33-35); modifying a push-to-talk mitigation parameter based on the at least one metric of push-to-talk operation of the mobile communication device (for e.g., while monitoring the call activity, if the time delay exceeds the

Art Unit: 2681

expected delay, PTT latency will be reduced by transmitting group call signaling on some available common channel) (see col. 1, lines 44-48, and col. 12, lines 54-57, and col. 23, lines 26-30); reconfiguring the at least one push-to-talk session unavailability mitigation based on the modified push to talk mitigation parameter (modification process and the reconfiguration process are analogous) (see col. 1, lines 44-48, and col. 12, lines 54-57, and col. 23, lines 26-30).

Regarding claim 27, Crockett discloses a method (see claim 26 rejection) wherein session unavailability comprises a delay of an activation of a push-to-talk session (see col. 23, lines 7-11, and lines 17-24).

Regarding claim 28, Crockett discloses a method (see claim 26 rejection) wherein the session unavailability mitigation comprises one of selecting a packet switched channel (i.e., voice and/or data may be converted into data packets, which are suitable for a particular distributed network. Thus, when a user presses the PTT key, a request is generated. With the request, data is formatted for transmission over an appropriate channel, which may be a circuit switched or a packet switched) (see col. 19, line 64 through col. 20, lines 3, and col. 20, lines 19-30).

Regarding claim 29, Maggenti discloses a method (see claim 26 rejection) wherein the session unavailability mitigation comprises selecting a circuit switched channel (i.e., voice and/or data may be converted into data packets, which are suitable for a particular distributed network. Thus, when a user presses the PTT key, a request is generated. With the request, data is formatted for transmission over an appropriate channel, which may be a circuit switched or a packet switched) (see col. 19, line 64 through col. 20, lines 3, and col. 20, lines 19-30).

Regarding claim 30, Crockett discloses an apparatus for push-to-talk operation (see

Art Unit: 2681

abstract), comprising: a usage monitor configured to monitor push-to-talk usage of a mobile communication device (i.e., Media Control Unit) (see col. 8, lines 48-49, and 62); a metric determination module configured to determine a push-to-talk metric based on the push to talk usage of the mobile communication device (PTT latency) (see col. 1, lines 44-48, and col. 21, line 43, and col. 23, lines 38-48); and a mitigation selector configured to select a push-to-talk session unavailability mitigation based on the push-to-talk metric (see col. 23, lines 26-37).

Regarding claim 31, Crockett discloses an apparatus (see claim 30 rejection) wherein the session unavailability mitigation comprises a mitigation of delay of an activation of a push-to-talk session (see col. 23, lines 7-11, and lines 17-24).

Regarding claim 32, Crockett discloses an apparatus (see claim 30 rejection) wherein the session unavailability mitigation comprises selecting a packet switched channel (i.e., voice and/or data may be converted into data packets, which are suitable for a particular distributed network. Thus, when a user presses the PTT key, a request is generated. With the request, data is formatted for transmission over an appropriate channel, which may be a circuit switched or a packet switched) (see col. 19, line 64 through col. 20, lines 3, and col. 20, lines 19-30).

Regarding claim 33, Crockett discloses an apparatus (see claim 30 rejection) wherein the session unavailability mitigation is a mitigation of interruption of a push-to-talk channel (group call signaling, such as the floor-control requests, floor-control responses, and dormancy wakeup messages, may be transmitted on some available common channels, without waiting for dedicated traffic channels to be re-established) (see col. 23, lines 26-30).

Regarding claim 34, Crockett discloses an apparatus (see claim 30 rejection) wherein the session unavailability mitigation comprises selecting a circuit switched channel (i.e., voice

and/or data may be converted into data packets, which are suitable for a particular distributed network. Thus, when a user presses the PTT key, a request is generated. With the request, data is formatted for transmission over an appropriate channel, which may be a circuit switched or a packet switched) (see col. 19, line 64 through col. 20, lines 3, and col. 20, lines 19-30).

Regarding claim 35, Crockett discloses an apparatus (see claim 30 rejection) wherein the push-to-talk metric is based on a measurement of a length of a delay of a push-to-talk channel activation (i.e., inherent measurement of time delay between when the user requests the floor and when he receives a positive or negative confirmation from the server that he has the floor) (see col. 1, lines 44-48, and col. 21, line 43).

Regarding claim 36, Crockett discloses an apparatus (see claim 30 rejection) wherein the push-to-talk metric is based on a time measurement of the length of time of a push-to-talk channel interruption (i.e., time delay between when the user requests the floor and when he receives a positive or negative confirmation from the server that he has the floor) (see col. 1, lines 44-48).

Regarding claim 37, Crockett discloses an apparatus (see claim 30 rejection) wherein the push-to-talk metric is based on a time between subsequent push-to-talk sessions from the same mobile communication device (i.e., floor control requests where the user would send a message, and floor control response where the user would receive a message) (see col. 16, lines 41-54, and col. 23, lines 26-30).

Regarding claim 38, Crockett discloses an apparatus (see claim 30 rejection) wherein the push-to-talk metric is based on a probability of a push-to-talk session from one mobile communication device and a subsequent push-to-talk session from another mobile

communication device on a reverse channel (floor control request and floor control response) (see col. 16, lines 41-54, and col. 23, lines 26-30).

Regarding claim 39, Crockett discloses an apparatus (see claim 30 rejection) wherein the push-to-talk metric is based on a length of time of a push-to-talk session (i.e., time delay) (see col. 1, lines 44-48).

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 9-10, and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Crockett in view of Dailey, U.S. Patent No. 6449491.

Regarding claim 9, Crockett discloses a method as described above (see claim 1 rejection).

Although Crockett discloses a method of push-to-talk operation as described above, Crockett fails to disclose a method of push-to-talk operation wherein the session unavailability mitigation comprises prohibiting a network handover of the mobile communication device.

However, Dailey discloses a terminal, which includes a PTT button, operatively associated with a disclosed controller and it is used to initiate and conduct half-duplex group calls. During the half-duplex group calls, most terminals of the group are not transmitting at any given time; as a result, these terminals cannot transmit information that is needed for handoffs.

Thus, network handover would be prohibited because of this inability (see col. 8, lines 64-67).

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to combine the teachings of Crockett with the teachings of Dailey to arrive at a PTT method wherein the session unavailability mitigation comprises prohibiting a network handover of the mobile communication device. Taking into consideration the process of transferring data session from one channel to another, as described by Crockett, the combination of Crockett and Dailey to arrive at the claimed invention would be a mere addition to the method disclosed by Crockett for his method inherently includes the teachings of Dailey.

Regarding claim 10, Crockett discloses a method as described above (see claim 1 rejection).

Although Crockett discloses a method of push-to-talk operation as described above, Crockett fails to disclose a PTT method wherein the session unavailability mitigation comprises prohibiting a network handover of the mobile communication device for a selected time period.

However, Dailey disclosed that in order to provide handoff, information must be transmitted over the traffic channel by the terminal (see col. 7, lines 60-67).

Therefore, it would have obvious to one of ordinary skill in the art at the time of the invention to combine Crockett and Dailey to obtain the claimed invention. The motivation to do so would have been to be able to use fewer channels for the group call.

Regarding claim 19, Crockett discloses a method as described above (see claim 1 rejection).

Although Crockett disclosed a method as described above, Crockett fails to disclose a method wherein the push-to-talk metric is based on a probability of handoff of the push-to-talk

session

However, Dailey discloses that handoffs can be provided as terminals move from an area to another (see col. 8, lines 60-64).

Therefore, it would have obvious to one of ordinary skill in the art at the time of the invention to combine Crockett and Dailey to obtain the claimed invention. The motivation to do so would have been to be able to use fewer channels for the group call.

Conclusion

8. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.


Maggenti et al., "System and method for providing group communication services in an existing communication system." U.S. Patent No. 6477150.

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Pierre-Louis Desir whose telephone number is 703-605-4312. The examiner can normally be reached on (571) 272-7799.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Joseph Feild can be reached on (571) 272-4090. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2681

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


Pierre-Louis Desir
AU 2681
10/06/2005


ERIKA A. GARY
PRIMARY EXAMINER